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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/539,591	01/17/2006	Morgan Larsson	1807-0187PUS1	4758
2292 7590 02/17/2010 BIRCH STEWART KOLASCH & BIRCH PO BOX 747 FALL S CHUIDCH, MA 22040, 0747			EXAMINER	
			TENTONI, LEO B	
FALLS CHURCH, VA 22040-0747			ART UNIT	PAPER NUMBER
			1791	
			NOTIFICATION DATE	DELIVERY MODE
			02/17/2010	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

mailroom@bskb.com

	Application No.	Applicant(s)				
	10/539,591	LARSSON, MORGAN				
Office Action Summary	Examiner	Art Unit				
	Leo B. Tentoni	1791				
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1) Responsive to communication(s) filed on 19 Oc	ctober 2009.					
,— · · · · · · · · · · · · · · · · · · ·	action is non-final.					
<i>,</i> —	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
closed in accordance with the practice under <i>E</i>						
Disposition of Claims						
4)⊠ Claim(s) <u>1,3-7,9-15 and 17</u> is/are pending in the application.						
4a) Of the above claim(s) <u>9-15 and 17</u> is/are withdrawn from consideration.						
5) Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>1 and 3-7</u> is/are rejected.						
7) Claim(s) is/are objected to.						
8) Claim(s) are subject to restriction and/or	election requirement.					
Application Papers						
9)☐ The specification is objected to by the Examine	r					
10)⊠ The drawing(s) filed on 19 October 2009 is/are: a)⊠ accepted or b)□ objected to by the Examiner.						
<i>,</i>	<i>i</i> — · <i>i</i> — <i>i</i>	•				
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.						
Priority under 35 U.S.C. § 119						
	nuicuitu undan 25 H.C.C. \$ 440/a)	(4) ~ (5)				
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).						
·— ·—	a) All b) Some * c) None of:					
1. Certified copies of the priority documents have been received.						
2. Certified copies of the priority documents have been received in Application No						
3. Copies of the certified copies of the priority documents have been received in this National Stage						
application from the International Bureau (PCT Rule 17.2(a)).						
* See the attached detailed Office action for a list of the certified copies not received.						
Attachment(s)						
1) Notice of References Cited (PTO-892)	4) Interview Summary					
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08)	Paper No(s)/Mail Da 5) Notice of Informal P					
Paper No(s)/Mail Date <u>12292009</u> .	6) Other:	atom, pphoanon				

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DETAILED ACTION

Election/Restrictions

1. Claims 9-15 and 17 remain withdrawn from further consideration pursuant to 37 CFR 1.142(b), as being drawn to a nonelected invention, there being no allowable generic or linking claim. Applicant timely traversed the restriction (election) requirement in the reply filed on 29 April 2009.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

3. Claims 1 and 3-7 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. In claim 1, line 5, the newly-added limitation of "alternately supplying energy from one radiation gun" (emphasis added) is not supported by the originally-filed specification and thus, constitutes new matter.

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Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 5. Claims 1 and 3-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over any one of Benda et al (U.S. Patent 5,393,482 A), Huang (U.S. Patent Application Publication 2003/0173713 A!) or Heugel (U.S. Patent Application Publication 2004/0061260 A1) in combination with Andersson et al (WO 01/81031 A1) for the reasons of record.

Response to Arguments

- 6. Applicant's arguments filed on 19 October 2009 have been fully considered but they are not persuasive.
- 7. Applicant argues (page 9) that Benda et al (U.S. Patent 5,393,482 A) has no teaching whatsoever regarding multiple fusion zones and this reference may not be relied on as a basis for maintaining the current restriction requirement. Examiner responds that Benda et al does teach at least two fusion zones and may be relied on as a basis for maintaining the current restriction requirement.
- 8. Applicant argues (page 10) that the fact that both the method and apparatus claims of the present invention contain the

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corresponding special technical feature of simultaneously propagating fusion zones is a sufficient basis for unity of invention, and the Examiner's opinion with respect to the novelty of the unifying special technical features is not a factor in a PCT Rule 13 analysis. Examiner responds that the restriction requirement does not contain any opinion with respect to novelty. The restriction requirement sets forth that there is a lack of unity between the claims of Group I (now claims 1 and 3-7) and Group II (now claims 9-15 and 17) because the claims fail to constitute a special technical feature since Benda et al (U.S. Patent 5,393,482 A) discloses, suggests or teaches at least two fusion zones. Furthermore, Huang (U.S. Patent Application Publication 2004/0061260 A1) also disclose, suggest or teach at least two fusion zones.

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- 9. Applicant argues (page 11) that Heugel is not a proper reference against the present application because Heugel has a U.S. filing date of September 29, 2003 while the present application has a foreign priority date of December 19, 2002. Examiner responds that the present application is entitled to its international filing date of December 12, 2003 and a certified translation of the foreign priority document is needed to overcome the rejection of the claims based on Heugel.
- 10. Applicant argues (pages 11 and 12) that neither Benda et al nor Huang teach or suggest that moving a focal point creates two or more fusion zones that propagate simultaneously through the

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selected area during forming, and also that Benda et al teaches using a single sintering beam at a single point for powder bed fusion and that Huang is concerned with whole-layer x-ray curing, not beam fusion. Examiner responds that both Benda et al and Huang are directed to beam fusion and that both references disclose, suggest or teach the aspect of at least two fusion zones.

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Conclusion

11. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS**ACTION IS MADE FINAL. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37

CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leo B.

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Tentoni whose telephone number is (571) 272-1209. The examiner can normally be reached on Monday - Friday (6:30 A.M. - 3:00 P.M.).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christina A. Johnson can be reached on (571) 272-1176. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Leo B. Tentoni/ Primary Examiner, Art Unit 1791